## ABSTRACT OF THE DISCLOSURE

A heat exchanger for cooling exhaust gas, around which a liquid cooling medium flows on the outside, including a bundle of rectangular tubes provided as ducts for the exhaust gas whose ends are welded into tube bottoms. The bundle of rectangular tubes is surrounded with a sheet metal jacket which follows the contour of the bundle and which is provided with a cooling medium inlet and a cooling medium outlet. The ends of the sheet metal jacket are provided with welded-on flange plates which are each open by means of a central opening with respect to the bundle of rectangular tubes and which are provided with fastening devices for fastening onto pipe sections of an exhaust pipe.